

WHAT IS CLAIMED IS:

1. A casting method for manufacturing a caliper body of a vehicular disc brake, said vehicular disc brake having a pair of frictional pads disposed opposite to each other with a disc rotor held therebetween, said caliper body including a cylinder disposed on one side of the disc rotor, a reaction pawl disposed on the other side of the disc rotor, and a bridge for coupling said cylinder and said reaction pawl at the outer peripheral side of the disc rotor, said casting method comprising the step of:
- 10 forming a cavity corresponding to a shape of said caliper body while the side of molding said bottom portion of said cylinder is disposed in a vertically upper part of said cavity and also the side of molding said reaction pawl is disposed in a vertically lower part of said cavity; and
- 15 molding a base material into said cavity through a sprue which is disposed at a portion molding said bottom portion of said cylinder.
2. The casting method for manufacturing the caliper body as claimed in claim 1, wherein said casting method comprises a gravity casting method.
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3. The casting method for manufacturing the caliper body as claimed in claim 1, wherein the side of molding said cylinder of said cavity is made an action chamber; the side of molding
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said reaction pawl and said bridge is made a reaction chamber;
and the site of molding a thick-walled side between said cylinder
and said bridge is made a central chamber, and

wherein the ratio of volume of the central chamber to that
5 of the reaction chamber is set in the range of 0.6 to 1.25, and

the ratio of volume of the central chamber to that of the
action chamber is set in the range of 0.7 to 1.35.

4. The casting method for manufacturing the caliper body
10 as claimed in claim 1, wherein said base material is aluminum
or aluminum alloy.

5. The casting method for manufacturing the caliper body
as claimed in claim 3, wherein said base material is aluminum
15 or aluminum alloy.

6. A caliper body of a vehicular disc brake to be made by
a casting method, said vehicular disc brake having a pair of
frictional pads disposed opposite to each other with a disc rotor
20 held therebetween, said caliper body including a cylinder
disposed on one side of the disc rotor, a reaction pawl disposed
on the other side of the disc rotor, and a bridge for coupling
said cylinder and said reaction pawl at the outer peripheral side
of the disc rotor, said caliper body comprising:

25 a union hole formed at the bottom portion of said cylinder

of the caliper body as a sprue for molding a caliper body with a base material, wherein the caliper body is molded with a cavity disposed with said union hole, while the side of molding said bottom portion of said cylinder is disposed in a vertically upper part of said cavity and also the side of molding said reaction pawl is disposed in a vertically lower part of said cavity.

7. The caliper body of the vehicular disc brake as claimed in claim 6, wherein the side of providing said cylinder is made an action chamber; the side of providing said reaction pawl and said bridge is made a reaction chamber; and the thick-walled connection between said cylinder and said bridge is made a central chamber, and

wherein in the state of cast metal after casting but before being subjected to a cutting process,

the ratio of volume of the central chamber to that of the reaction chamber is in the range of 0.6 to 1.25, and

the ratio of volume of the central chamber to that of the action chamber is in the range of 0.7 to 1.35.

8. The caliper body of the vehicular disc brake as claimed in claim 6, wherein the side of providing said cylinder is made an action chamber; the side of providing said reaction pawl and said bridge is made a reaction chamber; and the thick-walled connection between said cylinder and said bridge is made a central

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chamber, and

wherein in the state of cast metal after casting and subjected to a cutting process,

the ratio of volume of the central chamber to that of the
5 reaction chamber is in the range of 0.6 to 1.25, and

the ratio of volume of the central chamber to that of the action chamber is in the range of 0.7 to 1.35.

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9. The caliper body of the vehicular disc brake as claimed
10 in claim 6, wherein said cylinder is singly disposed in the central portion of said one side.

10. The caliper body of the vehicular disc brake as claimed
in claim 7, wherein said cylinder is singly disposed in the
15 central portion of said one side.

11. The caliper body of the vehicular disc brake as claimed
in claim 8, wherein said cylinder is singly disposed in the
central portion of said one side.

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12. The caliper body of the vehicular disc brake as claimed
in claim 9, wherein said cylinder is singly disposed in the
central portion of said one side.

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~~13. The caliper body of the vehicular disc brake as claimed~~

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in claim 6, wherein said base material is aluminum or aluminum alloy.

14. The caliper body of a vehicular disc brake as claimed
5 6, wherein said caliper body is made by a gravity casting method.

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15. A caliper body of a vehicular disc brake to be made
by a casting method, the caliper body being used for the vehicular
disc brake wherein a pair of frictional pads disposed opposite
10 to each other with a disc rotor held therebetween, the caliper
body having a cylinder disposed on one side of the disc rotor,
a reaction pawl disposed on the other side of disc rotor, and
a bridge for coupling said cylinder and said reaction pawl on
the outer peripheral side of the disc rotor, wherein the caliper
15 body is cast by a cavity with the side of molding the bottom
portion of said cylinder disposed in the upper part of and in
the vertical direction of said cavity and with the side of molding
said reaction pawl disposed in the lower part of and in the
vertical direction thereof.

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16. The caliper body of a vehicular disc brake as claimed
15, wherein said caliper body is made by a gravity casting method.

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